

Amendments to the Specification

The paragraph starting at page 2, line 7 and ending at line 13 has been amended as follows.

--Consequently, there is being commercialized a system in which such printing apparatus and an image pickup apparatus such as a digital camera or a digital video camera are directly connected or integrally constructed to print the taken image information without going through a device for processing the image information, such as a computer.--

The paragraph starting at page 2, line 22 and ending at page 3, line 8 has been amended as follows.

--As an example, the Japanese Patent Application Laid-Open No. 9-65182 discloses an image input-output system capable of achieving input and output in an integral configuration. Such composite camera integrally includes image pickup means provided with an electronic ~~view finder~~ viewfinder and capable of recording the image information on a recording medium, and print means for printing the image information on a recording sheet, and is also provided with control means for interrupting the electric power supply to the above-mentioned electronic ~~view finder~~ viewfinder while the print means prints the image information on the recording sheet. Such configuration is effective for saving the electric power since the electric power is not supplied to the electronic ~~view finder~~ viewfinder during the printing operation, so that the user can easily use the system without worrying about the electric power supply.--

The paragraph starting at page 4, line 22 and ending at line 27 has been amended as follows.

--However, such conventional example does not provide a satisfactory solution in compactization, cost, speed, convenience of ~~use etc.~~ use, etc., in sufficient manner in case a system is constructed with a printer apparatus and an image input apparatus such as a digital camera.--

The paragraph starting at page 5, line 1 and ending at line 3 has been amended as follows.

--In particular, certain preparations ~~preparation~~ are required until the printing operation can be executed, so that the print can be easily obtained.--

The paragraph starting at page 5, line 4 and ending at line 10 has been amended as follows.

--For example, in order to execute ~~executing~~ a printing operation by a print instruction from the digital camera, it is required to connect the printer apparatus to the digital camera, then to confirm that the printing is enabled, to set the digital camera at a print mode and to provide the print instruction in such print mode.--

The paragraph starting at page 5, line 11 and ending at line 18 has been amended as follows.

--Also in case the printer is connectable not only to the digital camera, but also to a personal computer or the like, it is necessary, in such printer, to set that the connection is made in to the digital camera. Consequently, there is required a procedure of executing such setting ~~in the digital camera~~ in the digital camera, so that it is furthermore difficult to obtain the print easily.--

The paragraph starting at page 8, line 14 and ending at line 27 has been amended as follows.

--Fig. 1 is a schematic lateral view showing the configuration of a printer embodying the present invention. In the entire configuration of the printer, a recording sheet ~~are~~ sheet P ~~are~~ is separated and fed one by one by a feeding roller 3 into the main body 1 of the apparatus from a sheet cassette 2 in which the recording sheets are stacked. The recording sheets P are maintained in contact with the feeding roller 3 by a push-up plate 21 biased by a spring 20. The recording sheet P conveyed by the feeding roller 3 is pinched by paired conveying rollers 4 and is rendered capable of reciprocating through a recording unit. The paired conveying rollers 4 are ~~is~~ composed of a pinch roller 42 and a grip roller 41.--

The paragraph starting at page 9, line 1 and ending at line 12 has been amended as follows.

--In the recording unit, the platen roller 5 and a thermal head 6 generating heat according to the recording information are mutually opposed across the conveying path of the recording sheet, and an ink sheet 8, contained in an ink cassette 7 and provided with an ink layer consisting of thermally fusible or thermally sublimable ink and an overcoat layer coated on the printing surface for protecting the same, is pressed by the thermal head 6 to the recording sheet P and is selectively heated to execute transfer recording of a desired image onto the recording sheet P and overcoating a protective layer thereon.--

The paragraph starting at page 9, line 23 and ending at line 25 has been amended as follows.

--Therefore, the recording sheet P is reciprocated by the paired conveying rollers 4 by the number of the ink layers and the overcoat layer.--

The paragraph starting at page 11, line 2 and ending at line 6 has been amended as follows.

--After the printing with the ink layers, the recording sheet P is is guided to discharge rollers 4, 9-1, 2, 9-2 and is discharged in a direction from the rear part to the front part of the main body 1 whereby the recording operation is terminated.--

The paragraph starting at page 11, line 7 and ending at line 10 has been amended as follows.

--The discharge roller 9-1 † is brought into contact with the recording sheet P only at the discharging operation thereof, but is not stressed during the printing operation.--

The paragraph starting at page 12, line 1 and ending at line 16 has been amended as follows.

--In the ordinary thermal transfer printer, since three colors of Y, M and C are recorded in plane-sequential manner, there is required control for exactly matching the recording front ends of the respective colors. For this purpose, it is necessary to tightly grip and convey the recording sheet P by the paired conveying rollers 4. Therefore, an unrecordable margin is required ~~in~~ at the end portion of the recording sheet P in the conveying direction thereof. In consideration of this fact and in order to easily obtain a margin-free final print, the recording sheet P is provided, as shown in Fig. 3, with stitch hole lines for manually tearing off later the marginal portions which are firmly gripped by the paired conveying rollers 4 at the start of recording and cannot be used for recording.--

The paragraph starting at page 13, line 3 and ending at line 22 has been amended as follows.

--In the printer 1 shown in Fig. 1, the paired conveying rollers 4 are ~~is~~ composed of the pinch roller 42 and the grip roller 41, and the grip roller 41 is connected ~~to~~ by a reducing mechanism to the output shaft of a stepping motor and is reversibly driven by the rotation control

of the stepping motor. Since the recording sheet P is firmly pinched and reciprocated by the paired conveying rollers 4, the recording sheet P is also conveyed under exact position control by the rotation drive of the stepping motor. As an example, in case the recording pitch of a line by the thermal head 6 is 85 μm and the stepping motor has 4 steps for conveying the recording sheet P by a line, the recording sheet P can be conveyed by a line (namely 85 μm) by the rotation control of 4 steps of the stepping motor. In case the print area shown in Fig. 4 is 144 mm in the conveying direction, there can be printed 1694 lines and the recording sheet P can be conveyed by a corresponding amount by the rotation of 6776 steps of the stepping motor.--

The paragraph starting at page 16, line 27 and ending at page 17, line 16 has been amended as follows.

--In the foregoing description, the control means 19 is assumed to control the recording position by managing the number of rotation steps of the stepping motor in the entire printing operation based on a detection signal for the leading end of the recording sheet detected initially by the sensor 10 and on the relationship between the number of steps of the stepping motor and the position in the conveying operation of the recording sheet P, but such system is not restrictive and there may also be adopted a configuration of managing the recording position by detecting the leading end of the recording sheet by a sensor positioned at the leading end portion of the recording sheet at the transfer recording of the Y, M, C colors and the overcoat layer and managing the number of rotation steps of the stepping motor based on such signal.--

The paragraph starting at page 17, line 17 and ending at line 24 has been amended as follows.

--Also in the foregoing description, the transfer of the overcoat layer is assumed to be executed only by the on/off drive the thermal head, but there may also be added such control as to gradually increase the amount of heat generation at the start of transfer of the overcoat layer and to gradually decrease the amount of heat generation at the end of transfer of the overcoat layer.--

The paragraph starting at page 18, line 25 and ending at page 19, line 4 has been amended as follows.

--In a state capable of communication with the main body 1 of the printer apparatus by the cable 27 or wireless means, the print instruction is given by a predetermined procedure whereupon the digital camera 29 transmits necessary information to the printer apparatus and a print ~~print~~ output is obtained from the main body 1 of the printer apparatus.--

The paragraph starting at page 20, line 7 and ending at line 26 has been amended as follows.

--Referring to Fig. 5, the digital camera 29 obtains an image signal by image pickup operation by a CCD in an image pickup unit 101. The signal obtained by image pickup operation is subjected to a color conversion process, a filtering process, etc., in an image processing unit 102, and thereby converted into image data. The converted image data ~~are~~ is stored in a memory unit 103, by a control unit 104 composed, for example, of a CPU, a ROM, a

RAM, etc. Then the control unit 104, in case of the reproduction mode, reads the image data from the memory unit 103 and controls a display control unit 106 to display the image data on a display unit 105. Also in response to the print instruction from an input unit 108, the control unit 104 converts the image data stored in the memory unit 103 into data for the printer and transmits thus converted image data to a printer 118 through a data I/F unit 107. From the printer there are transmitted an identification signal, a status, etc., of the printer through the data I/F unit 107.--

The paragraph starting at page 20, line 27 and ending at page 21, line 5 has been amended as follows.

--The printer 1 is provided with a data I/F unit 111 for executing communication with the digital camera 29 and the host computer 30. A control unit 112 composed of a CPU, a ROM, a RAM, etc., controls a printer engine to print the image data, received through the data I/F unit 111.--

The paragraph starting at page 21, line 6 and ending at line 13 has been amended as follows.

--The host computer 30 such as a personal computer is composed of a data I/F unit 121 for executing communication with the digital camera 29 and the printer, a memory unit 122 such as a hard disk, a control unit 123 composed of a CPU, a ROM, a RAM, etc., a display unit 124 such as a CRT display and an input unit 125 for entering data from a keyboard, a mouse, etc.--

The paragraph starting at page 23, line 20 and ending at line 23 has been amended as follows.

--Receiving information indicating the end of printing, the camera confirms that the anticipated operation has ~~have~~ been completed, and informs the printer of such effect.--

The paragraph starting at page 26, line 7 and ending at line 20 has been amended as follows.

--A step S901 discriminates whether the digital camera is in the reproduction mode. If the camera is, for example, set in the image pickup mode and is identified as not being in the reproduction mode, the sequence proceeds to a step S902 to execute ~~executes~~ a process in the set mode. In case the camera is identified to be in the reproduction mode, the sequence proceeds to a step S903 for executing a process in the reproduction mode. In the reproduction mode, there can be executed, for example, a process of switching the displayed image 1050 on the display unit 105 by the depression of arrow keys 1006, 1007 shown in Fig. 10. Also the mode can be switched by a mode switching switch 1001 shown in Fig. 1.--

The paragraph starting at page 27, line 22 and ending at page 29, line 9 has been amended as follows.

--In case the step S913 identifies that the setting button 1004 has not been depressed (NO), the user does not currently wish the execution of printing, so that the sequence proceeds to a step S915 for discriminating the depression of selection buttons 1006, 1007. In

case the step S915 identifies that the selection button 1006 or 1007 has been depressed (YES), the sequence proceeds to a step S916 for selecting in succession operations (change of print style, cancellation of printing, and execution of printing) shown in Fig. 12 and displaying such selection by changing the tone of the display unit. Then the sequence proceeds to a step S917 for discriminating the depression of the setting button 1004. In case the selection buttons 1006, 1007 have not been depressed (NO), the user does not wish to change the currently selected operation, so that the sequence returns to the step S913 for discriminating the depression of the setting button 1004. In case a step S917 identifies that the setting button 1004 has been depressed (YES), the sequence proceeds to a step S918 for executing the operation selected by the step S916. In case it is identified that the setting button 1004 has not been depressed (NO), the user does not wish the execution of the currently selected operation, so that the sequence proceeds to a step S919 for discriminating again the depression of the selection buttons 1006, 1007. In case the step S919 identifies the depression of the selection button 1006 or 1007 (YES), the sequence returns to the step S916 for selecting in succession operations (change of print style, cancellation of printing, and execution of printing) shown in Fig. 12 and displaying such selection by changing the tone of the display unit. Then the sequence proceeds to a the step S917 for discriminating the depression of the setting button 1004. In case it is identified that the selection buttons 1006, 1007 have not been depressed (NO), the user does not wish to change the currently selected operation, so that the sequence returns to the step S917 for discriminating the depression of the setting button 1004.--